IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of: Atty. Docket No.: US010572

Srinivas GUTTA   Group Art Unit: 3622

Serial No.: 10/014,202   Examiner: Daniel Lastra

Filed: November 13, 2001

Title: METHOD AND APPARATUS FOR RECOMMENDING ITEMS OF INTEREST
BASED ON PREFERENCES OF A SELECTED THIRD PARTY

Mail Stop **APPEAL BRIEF – PATENTS**
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

<u>REPLY BRIEF ON APPEAL UNDER 37 C.F.R. 41.41(a)(1)</u>

Sir:

      This is a reply brief to the Examiner's Answer dated 26 July 2007. The
Examiner's Answer stated no new grounds of rejection nor has a supplemental
examiner's answer been issued.

      This paper includes (each beginning on a separate sheet):

1. Identification page;
2. Status of claims page;
3. Grounds of rejection to be reviewed on appeal page;
4. Argument pages.

STATUS OF CLAIMS

Claim 2 is canceled.

Claims 1 and 3-23 are pending in the application.

Claims 1 and 3-23 stand rejected by the Examiner under 35 U.S.C. § 102(b).

These rejected claims are the subject of this reply brief.

GROUNDS OF REJECTION TO BE REVIEWED ON APPEAL

Claims 1 and 3-23 stand rejected under 35 U.S.C. § 102(b) over U.S. Patent 5,758,257 to Herz.

ARGUMENT

I. IMPROPER INTERPREATION OF THE CLAIMS BY EXAMINER

In its Answer, the Office restricts the Appellant's use of the word "clustering" in claim 1 to mean partitioning a customer viewing profile into a plurality of customer viewing profiles, thereby equating the Applicant's use of the words "clustering" and "partitioning" as one and the same (see Examiner's Response, page 8, lines 11-14). The Applicant respectfully suggests that such argument improperly limits the scope of the word "partition" in claim 1 by importing language from the specification as a means to limit rather than interpret the language of said claim. Though understanding the claim language may be aided by explanations contained in the written description, it is important not to import into a claim limitations that are not part of the claim. Phillips v. AWH Corp. (Fed. Cir. 2005) (*en banc*).

Instead of adopting a restrictive interpretation of the terms in claim 1 the Examiner is adjured by the Office to give claims their "broadest reasonable construction". In re Am. Acad. of Sci. Tech. Ctr., 367 F.3d 1359, 1364 (Fed. Cir. 2004). By insisting on a particular definition of the word "partitioning" the Examiner is failing to abide by this axiom.

The Applicant respectfully suggests that the meaning of the word "partition" in claim 1 be considered in the context of the surrounding words of the claim as the claims

themselves provide substantial guidance as to the meaning of particular claim terms. Phillips v. AWH Corp. (Fed. Cir. 2005)(en banc); ACTV, Inc. v. Walt Disney Co., 346 F.3d 1082, 1088 (Fed. Cir. 2003). Claim 1, among other steps, recites, "**partitioning** a third party selection history into a **plurality** of **clusters**." The context of the language in this claim suggests that that the use of both words in the same sentence implies different meanings to avoid redundancy and indefiniteness.

What must also be considered is the use of the word "plurality" in the context of claim 1 and how it relates to the singular form of "a third party selection history". The ordinary and customary reading of this language suggests that from a singular history is derived a multitude of clusters. As such, this language calls for an interpretation of the term "partitioning" to mean an act of separation as opposed to one of grouping or combining as argued by the Examiner.

For the reasons given above, the Applicant respectfully argues that the Examiner is in error in his methodology for interpreting the language of claim 1 of this Application.

II. THE EXAMINER HAS FAILED TO MEET PRIMA FACIE SHOWING OF ANTICIPATION

A. NOT EXACT ANTICIPATION

The Office has omitted one or more claimed elements and has not established *prima facie* that the claims are anticipated.

> MPEP § 2131 states:
>
> "A claim is anticipated only if **each and every element** as set forth in the claim is found, either expressly or inherently described, in a singe prior art reference." *Verdegall Bros. V. Union Oil Co. of California*, 814 F.2d 628, 631, 2 USPQ2d 1051, 1053 (Fed. Cir. 1987). "The **identical invention** must be shown in as **complete detail** as is contained in the . . . claim." *Richardson v. Suzuki Motor Co.*, 868 F.2d 1226, 1236, 9 USPQ2d 1913, 1920 (Fed. Cir. 1989).

Claim 1, upon which claims 3-6 depend, recites a computerized method performed by a data processor for recommending one or more available items to a target user. Claim 1, among other steps, recites, "**partitioning** a third party selection history into a plurality of cluster." The Office has not established *prima facie* that Herz '257 teaches "partitioning a third party selection history into a plurality of clusters." Thus, the Office has not made a *prima facie* showing that claim 1 is anticipated by Herz '257.

Claim 1 also recites, "modifying a target user's history of selecting said one or more available items with one or more third party clusters to produce a modified target

user's history". The Office has not established *prima facie* that Herz '257 teaches "modifying a target user's history of selecting said one or more available items with one or more third party clusters to produce a modified target user's history." Thus, the Office has not made a *prima facie* showing that claim 1 is anticipated by Herz '257.

The Examiner asserts that Appellant's "clustering" is equivalent to "partitioning" and, therefore; that Herz '257 contains the stated limitation of the present Application (see Examiner's Response, page 8, line 21). The Applicant respectfully disagrees as the Examiner has improperly interpreted the language of claim 1 for reasons stated above and incorporated by reference herein. Given the broadest construction of the language and the context of such language in claim 1 of the Application, the applicant believes the two inventions to be distinguishable as claimed and therefore, not anticipated.

The Applicant further advances the argument that the invention disclosed in Herz '257 does not anticipate by suggesting that the Office examine how the two inventions teach updating a user's profile based on information contained in a profile belonging to one or more other parties and how either teaches customization of a user's profile. Doing so discerns two separate inventions.

In Applicant's invention, both the third party and user viewing histories (i.e. profiles) contain a category cluster (i.e. drama) which are interchangeable at the behest of the respective profile's owner (pages 5 and 6 of specification) This is to say; the profiles are customizable by interchanging clustered program, item or product categories. In Herz

'257, a customer profile, consisting of a vector of preferences, is **automatically** and/or

collectively optimized by the Method of Successive Average or clustering algorithms

(see generally cols. 10 – 15 (active feedback technique), cols. 29-33 (passive feedback

technique), and cols. 34-40 (customer clustering))

>With respect to an active feedback technique the Herz '257 patent discloses:

>>". . . an active feedback mechanism [where] the setting of the new values [take] into consideration both the old and the new data [in a method] formally termed MSA, or Method of Successive Average." (col. 14, lines 4-67 and col. 15, lines 1-21); further,

>>"Another way to make adjustments to the customers' combined ratings is through the clustering of customers . . . Only those that do not belong will be subject to an adjustment." (col. 15, lines 34-44).

This section of the Herz '257 patent is only section with an involved discussion of how

an individual user can contribute directly to his profile through express interaction (i.e.

"rave reviews").   Even here, the customization of the user profile is tempered by MSA

and via the combining of ratings. At no point is the user confronted with a selection as to

which histories he wishes to incorporate into his profile, or allowed to actively construct

the nature of his profile without the involvement of an algorithm behind the scenes as is

disclosed in the Application. The decision as to what group a user wishes to belong to is

subject to an automatic adjustment in the Herz '257 disclosure, another key difference.

No mechanism for true customization based on interchangeable user clusters is disclosed

in the Herz '257 active feedback discussion.   If the Herz '257 patent did teach

customizable user profiles as disclosed in the Application, that language would be found

in this section discussing active user input. No such language exists. The fact that the

Herz '257 application itself describes its active feedback technique as a "filtering system" (col. 29, line 33) underscores this point.

    With respect to a passive feedback technique the Herz '257 patent discloses:

" ., . a passive feedback technique [whereby] the programming viewed by the customers are **automatically** monitored and used to adjust the customer profiles." (col. 14, lines 4-7); further,

". . [a monitoring system] augmented by a clustering algorithm which combines **passive** feedback with the use of customer profiles . . ." (col. 30, lines 34-37)

This language makes the distinction clear: the Herz '257 patent requires passive and automatic monitoring and adjustment of user profiles. This teaches away from the present Application, which encourages individual choice in profile construction and customization.

    With respect to customer clustering the Herz '257 patent discloses:

"[The] profiles for the clusters are updated on what the customers in the cluster watched [and] the profiles for the individuals in the cluster can be similarly updated." (col. 34, lines 50-54); further,

"[It is] necessary to recognize . , . customer **groups** as well as their **collective** profiles." (col. 34, lines 64-65).

The language of this disclosure clearly views clustering as a tool for optimization applied to groups and collective profiles with inherent efficiencies for automatically optimizing individual profiles. Categories are not first clustered, but rather the whole profile is optimized instantaneously – that is, the profiles are combined. Rather than picking and

choosing whole clustered categories, the overall profile is optimized to reflect the group profile. In this way customer categories, "video clubs" or "virtual channels" are formed. Herz '257 alludes to customization but the disclosure is non-enabling (col. 49, lines 1-18). Applicant invention demonstrates how customized customer profiles can be realized.

To underscore the fact that the process are different, i.e. that the Applicant partitions viewer histories into categorical clusters and that the Herz '257 patent discloses collective optimization of customer clusters, we look to the process of clustering as disclosed by Herz '257. This process is composed of three phases (col. 35, lines 16-21):

1) estimating the distribution of the customer population;

2) clustering the customer population; and

3) determining the correspondence of the video program categories to the customer clusters.

Here we clearly see that the video program categories are treated separately from the customer profiles. Program categories are paired to whole customer groups based on a membership function and a correspondence determined (col. 37, lines 31-48 and equations 34 and 35). Again, the whole customer cluster profile is being matched to program categories and not an individual user. Again, there is nothing in the disclosure that allows customers to customize their profile based on category clusters presented to them.

The examiner has argued that customization of a user's profile with third party viewing histories is found in Herz '257 (col.49, lines 1 to 20)(see Examiner's Response, page 4, lines 8-10), but this is not the case. Herz '257 gives only a vague notion of customizable profiles and celebrity profiles with no enablement. The customization process in claim 1 of the Application and enabled as disclosed in Fig. 6 of the same has no correlation in the Herz '257 disclosure and is, therefore, not anticipated.

To constitute an anticipation, all the claimed elements must be found in exactly the same situation and united in the same way to perform the identical function in a single unit of prior art. General Elect. Co. v. Nintendo Co., Ltd., 179 F.3d 1350 (Fed. Cir. 1999). This standard is not satisfied where the prior art reference merely discloses the "concept", "essence", "key" or "gist" of the patented invention "concepts do not anticipate" Panduit Corp. v. Dennison Mfg. Co., 774 F.2d 1082, 1101 (Fed. Cir. 1985). Anticipation cannot be predicated on teachings in a reference that are vague or based on conjecture. Datascope Corp. V. SMEC, Inc., 776 F.2d 320 (Fed. Cir. 1985). The Applicant's specific disclosure for implementing customized profiles via exchangeable third party viewing history clusters is, therefore, not read on the few general lines on point in the Herz '257 disclosure.

In summary, a careful analysis of how the two inventions teach updating a user's profile based on information contained in a profile belonging to one or more other parties and how either teaches customization of a user's profile reveal two distinct inventions. This distinction should be of primary concern when interpreting the language of the

11

claims in the Application. The import of the word "partitioning" becomes clear in the light of this analysis, as does the fact that such limiting language is not anticipated in Herz '257. The word "partitioning" in the context of language in claim 1 and as read in the light of the specification is critical for conveying the novel aspect of the Applicant's invention. Without it, the concept of interchangeable data clusters for the purpose of user profile customization would be lost. Furthermore, it is error on the part of the Examiner to cite to the vague and non-enabling language in Herz '257 Col. 49, lines 1-20 as anticipating the method by which the Application **specifically** discloses the customization of user profiles with third party data.

B. NOT INHERENT IN HERZ DISCLOSURE

Anticipation can occur when a claimed limitation is "inherent" or otherwise implicit in the relevant reference. SmithKline Beecham Corp. v. Apotex Corp., 403 F.3d 1328, 1329 (Fed. Cir. 2005)). To establish inherency, the extrinsic evidence must make clear that the missing descriptive matter is necessarily present in the thing described in the reference and that it would be so recognized in by persons of ordinary skill in the art. In re Robertson, 169 F.3d 1531, 1534 (Fed. Cir. 1993). The use of clustering third party viewing histories for later customization by a user is not inherent in the Herz '257 disclosure.

As stated in Applicant's argument above and incorporated by reference herein, the Herz '257 patent teaches a "filtering" system and/or a passive feedback system which

may adopt aspects of customer clustering for the purpose of group and collective profile optimization. The Applicant's disclosure is a wholly distinct process reliant on the partitioning of third-party viewing histories into subject category clusters for future, selective interchangeability between individual users. The applicant's disclosure is very much one based on active individual user input and customization. The process disclosed to effect the various embodiments of the Applicant's invention are set down with specificity, the details of which are not to be found in the Herz '257 patent. The technologies and techniques disclosed for effecting cluster interchangeability and user profile customization are wholly different. As such, it is untenable to argue that the claimed limitations of the present Application are inherent or otherwise implicit in the Herz '257 reference.

III. APPLICATION'S NOVEL ASPECTS ARE NOT OBVIOUSNESS IN LIGHT OF HERZ '257

Under 37 CFR § 41.50(b), the Board may, in its decision, make a new rejection of one or more of any of the claims pending in the case, including claims which have been allowed by the examiner. In order to anticipate such action on the part of the Board, the Applicant presents the following argument against rejection for obviousness under 35 U.S.C. § 103.

The grounds for rejection for obviousness are set forth in 35 U.S.C. § 103(a):

A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, **if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole** would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains.

To establish a *prima facie* case of obviousness, three basic criteria must be met. First, there should be some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the reference or to combine reference teachings. Second, there must be a reasonable expectation of success. Finally, the prior art reference (or references when combined) must teach or suggest all the claim limitations. The teaching or suggestion to make the claimed combination and the reasonable expectation of success must both be found in the prior art, and not based on applicant's disclosure. *In re* Vaeck, 947 F.2d 488, 20 USPQ2d 1438 (Fed. Cir. 1991); KSR Int'l Co. v. Teleflex, Inc. 127 S.Ct. 1727 (2007)("There is no necessary inconsistency between the idea underlying the TSM test and the *Graham* analysis"). In determining whether the invention as a whole is obvious under 35 U.S.C. § 103, the Office must first delineate the invention as a whole. In delineating the invention as a whole, the Office must look not only to the subject matter, which is literally recited in the claim in question, but also to those properties of the subject matter, which are inherent in the subject matter *and* are disclosed in the specification. It is this invention *as a whole,* and not some part of it, which must be obvious under 35 U.S.C. § 103. *In re* Antonie, 559 F.2d 618, 620, 195 USPQ 6,8 (CCPA 1977). The Herz '257 reference fails

to support such a showing of obviousness on all counts when both inventions are considered as a whole.

As argued above and incorporated by reference herein, the Herz '257 patent teaches a "filtering" system and/or a passive feedback system which may adopt aspects of customer clustering for the purpose of group and collective profile optimization. The Applicant's disclosure is a wholly distinct process reliant on the partitioning of third-party viewing histories into subject category clusters for future, selective interchangeability between individual users. The cited reference, therefore, teaches away from the present Application, which encourages individual choice in profile construction and customization. The present Application teaches away from filtering, and away from combined, automatic and concurrent updating of group and individual group member profiles. The individual is key to the present Application, the consensus of a group key in Herz '257. As such, there is no suggestion or motivation to modify the Herz '257 reference in a way to adopt the technologies and methods taught in the present Application. Also, as discussed above, the prior art reference does not teach or suggest all the claim limitations found in the current application. Anticipation cannot be predicated on teachings in a reference that are vague or based on conjecture. Datascope Corp. V. SMEC, Inc., 776 F.2d 320 (Fed. Cir. 1985). The Herz '257 reference does not anticipate either the partitioning of third party selection history into a plurality of clusters nor producing a modified user profile from a selection of one or more third party clusters. When considered, as a whole, the two inventions under scrutiny herein are wholly

different. Herz '257 does not anticipate the Application and the Application is not an obvious variant of Herz '257.

Independent claims 7, 14, 17, 18, 22 and 23 have been rejected on the same grounds as claim 1 and are therefore patentable for at least the same reasons described above.

Dependent claims depending from claims 1, 7, 14, 17, 18, 22 and 23 are patentable for at least the same reasons as the independent claims.

IV. CONCLUSION

In summary, the Applicant respectfully maintains that, in interpreting the Application, the Examiner is improperly importing claim limitations from the written description when he should be interpreting the meaning of such terms as "partitioning" and "clusters" in the context of the language of the claims themselves given the broadest reasonable construction. Given the proper interpretation of the language claimed in the application the Herz '257 does not anticipate. Further, the Applicant argues that the Office has failed to meet its *prima facie* case of anticipation when the present invention is considered as a whole and compared with the entire scope of the invention disclosed in the Herz '257 reference and the language of the present claims are analyzed in the appropriate context. An argument is also advanced against a possible new ground for rejection by the Board that the Application is obvious in light of Herz '257. Applicant

respectfully requests that the Examiner's rejection of claims 1 and 3-23 under 35 U.S.C.

§ 102(b) be reversed by the Board, that the Board not reject said claims for obviousness

under 35 U.S.C. § 103(a), and that the claims be allowed to pass to issue.

The commissioner is hereby authorized to credit any overpayment or charge

and fee (except the issue fee) to account 14-1270.

Respectfully submitted,

/Marcus A. Streips/

Reg. No. 58,524
Attorney for Applicant
ph. (845) 359-7700

Dated: September 18, 2007

Notaro & Michalos, P.C.
100 Dutch Hill Road, Suite 110
Orangeburg, New York 10962-2100

Customer No. 21706

Please direct all correspondence to:
Yan Glickberg, Registration No. 51,742
PHILIPS INTELLECTUAL PROPERTY & STANDARDS
P.O. Box 3001
Briarcliff Manor, NY 10510-8001
Phone: (914)333-9618
Fax: (914)332-0615